



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/043,014	01/08/2002	Timothy C. Homan	LA-7021-101.US/10021688	6111

7590 12/31/2003

FULBRIGHT & JAWORSKI L.L.P.

Billy A. Robbins

Twenty-Ninth Floor

865 South Figueroa

Los Angeles, CA 90017-2571

EXAMINER

TOATLEY, GREGORY J

ART UNIT

PAPER NUMBER

2836

DATE MAILED: 12/31/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/043,014

Applicant(s)

HOMAN ET AL.

Examiner

Sharon Polk

Art Unit

2836

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 08 January 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-10 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 08 January 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☒ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2.
- 4) ☒ Interview Summary (PTO-413) Paper No(s) _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Information Disclosure Statement

1. The information disclosure statement (IDS) submitted on April 1, 2002 has been considered by the examiner.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 10 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Regarding claim 10, there is a lack of antecedent basis regarding the claimed optocoupler.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claim 1 is rejected under 35 U.S.C. 102(e) as being anticipated by Chiu et al., (Chiu), US 6,326,882.

With regard to claim 1, Chiu teaches a load activation and grace period timing system comprising:

a monitor for detecting when a lamp switch is activated and providing an output signal at a first level representative thereof (12);

a timer (2) comprising a pulse generator (22, 23) and a counter (26), said counter receiving the output of said pulse generator, said timer receiving said output signal of said monitor to activate said pulse generator but to disable said timer so long as said first output signal is applied, said counter being enabled when said lamp switch is deactivated and said monitor output signal level changes to a second level, said counter counts said pulse generator output for a predetermined preset but variable time (e.g., abstract, fig. 3b); and

a power switch (7) for applying electrical power to said load when said monitor output signal is at said first level and continuing until said counter reaches said predetermined count (e.g., 1:46-67, 2:1-10).

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Chiu in view of Arichi et al., (Arichi), US 4,440,503.

With regard to claim 2, Chiu lacks the express teaching of an analog oscillator including a means for varying the frequency. However this feature is taught by Arichi (e.g., figs. 1-5). One of ordinary skill in the art would have been motivated at the time of the invention to modify Chiu for the purpose of providing an electronic timer having a plurality of time ranges which can be externally selected with ease (1:25-27).

Claims 3-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chiu and Arichi as applied to claims 1-2 above, and further in view of Hosotani et al., (Hosotani), US 6,549,430.

With regard to claim 3, Chiu as modified by Arichi teach the claimed system, but lack the teaching of the DC power supply and FET. However these features are taught

by Hosotani (2, 7). One of ordinary skill in the art at the time the invention was made would have been motivated to further modify Chiu for the purpose of providing a switch power supply circuit capable of maintaining constant the current flowing into the control terminal of a switching element, reducing the loss, and further preventing the failure of the switching element when an output is short-circuited (2:30-35).

With regard to claim 4, Chiu teaches a means for coupling the timer to the power switch (fig. 2).

With regard to claim 5, Chiu teaches or fairly suggests, the counter generating first and second logic level signals (3:8-44).

With regard to claim 6, Chiu is silent regarding the type of the claimed power switch. However official notice is taken that transistors (FET) are well known power circuit control transistors in the art having the conforming to the claimed properties. As such one would have been motivated to further modify Chiu with a FET as a means for coupling, for the purpose of providing reliable activation/deactivation.

Claims 7-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chiu and Arichi as applied to claims 1-2 above, and further in view of Temple, US 5,473,204.

With regard to claim 7, Chiu as modified by Arichi lack the teaching of the claimed power switch comprises a Triac. However this feature is taught by Temple (72). One of ordinary skill in the art at the time the invention was made would have been motivated to further modify Chiu with a Triac as taught by Temple because

Temple teaches that the user does not need to remember to return the switch to the OFF position each time the timer is used; the switch resets itself automatically to OFF (2:32-35).

With regard to claim 8, adding the feature of the optocoupler for coupling the timer to the power switch. Official notice is taken that optocoupler's are well known in the art for performing normal electronic functions. As such it would have been obvious to one of ordinary skill in the art at the time of the invention to further modify Chiu by adding an optocoupler for the purpose of resetting the timing circuit.

With regard to claim 9, Chiu teaches or fairly suggests, the counter generating first and second logic level signals (3:8-44).

Allowable Subject Matter

5. Claim 10 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter: The prior art of record does not teach or fairly suggest the coupling means as claimed in combination with the additional elements of the claim.

Pertinent Prior Art

6. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. US Patent Nos. 5,781,108, 5,745,927, 5,465,188, 4,968,870, and 4,349,748 disclose aspects of the claimed invention.

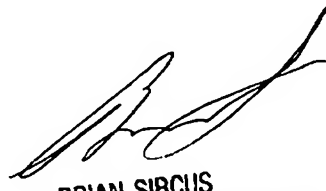
Communication with the PTO

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sharon Polk whose telephone number is 703-308-6257. The examiner can normally be reached on M-F 7-3:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Brian Sircus can be reached on 703-308-3119. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0956.

sp



BRIAN SIRCUS
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2800